

Title (en)

TWO-TONE IN-PHASE PI/2 BINARY PHASE-SHIFT KEYING COMMUNICATION

Title (de)

PHASEGLEICHE, BINÄRE ZWEITON-PI/2-PHASENUMTASTUNGSKOMMUNIKATION

Title (fr)

COMMUNICATION À MODULATION PAR CHANGEMENT DE PHASE BINAIRE VERS UNE PHASE PI/2 À DEUX TONALITÉS

Publication

EP 3711268 A1 20200923 (EN)

Application

EP 18878711 A 20181114

Priority

- US 201762586432 P 20171115
- CA 2018051444 W 20181114

Abstract (en)

[origin: US2019149381A1] A method and apparatus for communication, e.g. in an LTE system, that uses two tones with an in-phase pi/2 BPSK modulation with single carrier frequency-division multiple access (SC-FDMA). Pairs of input bits are converted to symbols using pi/2 BPSK, with each one of the pair of bits converted using a same symbol constellation, and successive pairs of bits converted using alternatingly different symbol constellations. The two constellations may be identical after a pi/2 radian rotation. Pairs of symbols corresponding to pairwise converted bits may be treated as the symbols for a pair of tones of a subsequent SC-FDMA, OFDMA, or similar processing operation.

IPC 8 full level

H04L 27/18 (2006.01); **H04J 1/00** (2006.01); **H04J 11/00** (2006.01); **H04L 27/26** (2006.01)

CPC (source: EP US)

H04L 5/0053 (2013.01 - US); **H04L 27/2636** (2013.01 - EP US); **H04L 27/3444** (2013.01 - EP US); **H04L 5/0007** (2013.01 - US);
H04L 27/2614 (2013.01 - EP US)

Designated contracting state (EPC)

AL AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MK MT NL NO PL PT RO RS SE SI SK SM TR

Designated extension state (EPC)

BA ME

DOCDB simple family (publication)

US 10931492 B2 20210223; US 2019149381 A1 20190516; EP 3711268 A1 20200923; EP 3711268 A4 20210721;
WO 2019095057 A1 20190523

DOCDB simple family (application)

US 201816192092 A 20181115; CA 2018051444 W 20181114; EP 18878711 A 20181114